



On behalf of:



of the Federal Republic of Germany

Powering Security Through Integration: Advancing the ASEAN Power Grid

Asia Clean Energy Forum, 1.3 Policy and Regulatory Frameworks for Energy Security, 10.06.2026

Mr. Maximilian Heil, GIZ – Regional Project Coordinator CASE

on behalf of Clean, Affordable and Secure Energy (CASE) for Southeast Asia

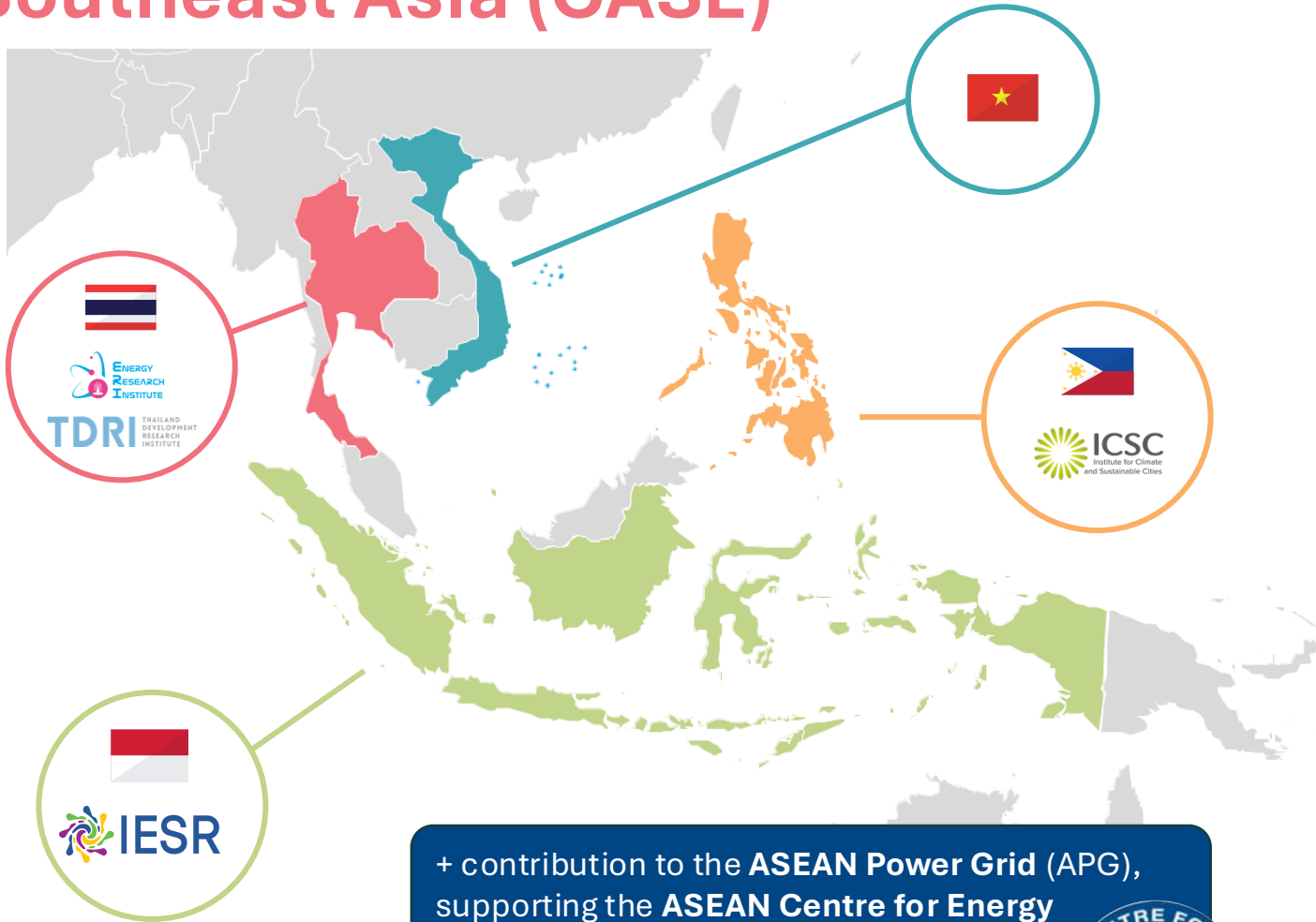


Structure



- CASE
- The ASEAN Power Grid (APG)
- The APG Advancement Programme

Clean, Affordable and Secure Energy for Southeast Asia (CASE)



Led by:



Focused work with **Local Partners** in:

- Indonesia
- Philippines
- Thailand
- Viet Nam

International Partners:



Funded by:

On behalf of:



of the Federal Republic of Germany



CASE Approach



CASE
for Southeast Asia



Mission: Facilitate an **evidence-based energy transition** in Southeast Asia considering energy security and affordability, towards global and country carbon neutrality net-zero targets.



**Research
and Evidence**

Improve evidence base for the energy transition in Southeast Asia



**Transparency
and Mapping**

Increase transparency and maximise cooperation of energy transition activities in the region.



**Dialogue
beyond the energy
sector**

Enhance inclusive exchanges with stakeholders affected by the energy transition.



**Technical
Assistance**

Strengthen capacities of key energy sector stakeholders.



**Promoting
public
discourse**

Initiate public discussions on the energy transition.



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The ASEAN Power Grid

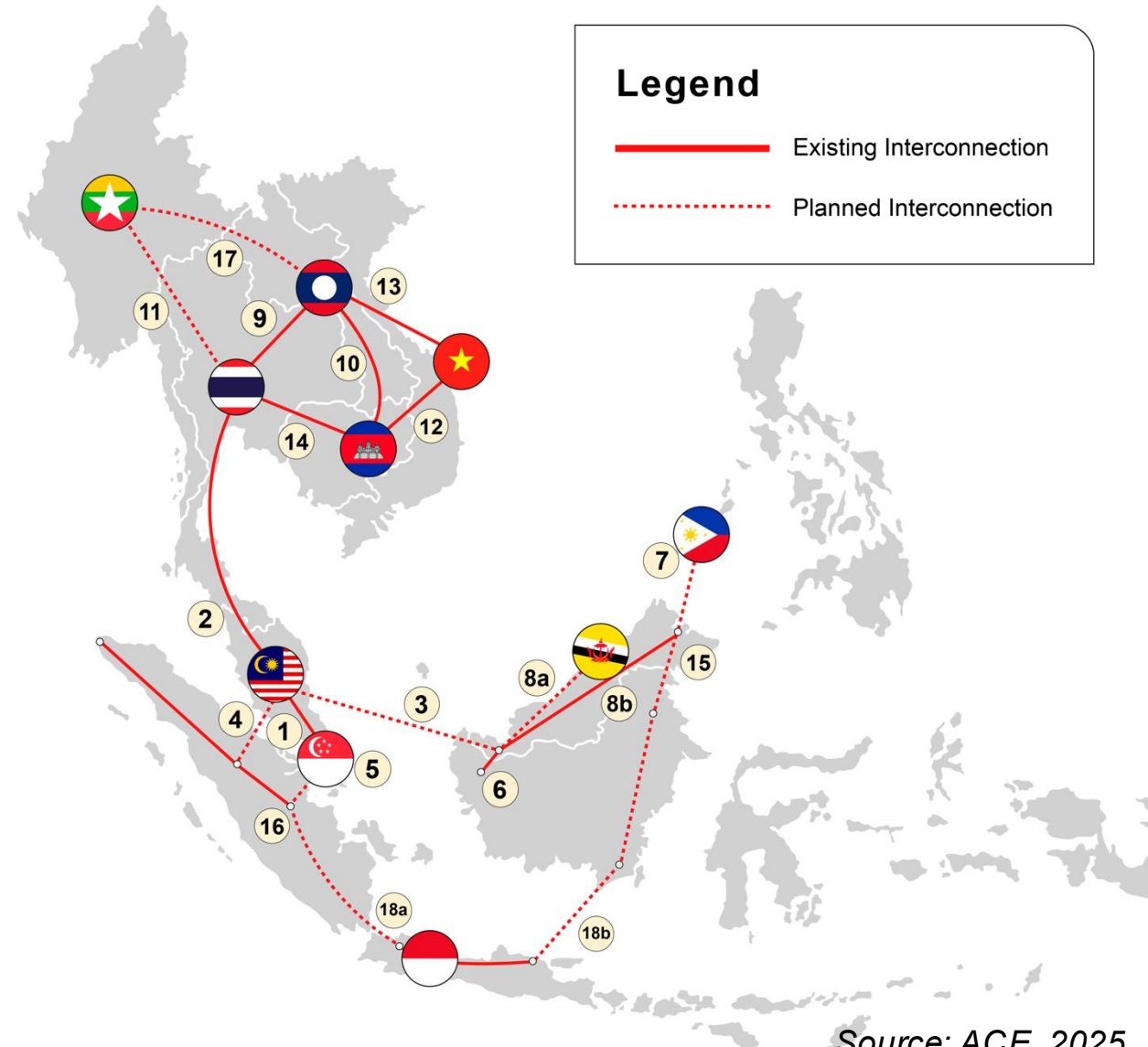
The ASEAN Power Grid

Regional Energy Integration

APG aims to connect ASEAN member states via cross-border electricity trade and interconnections.

Launched in 1999 with the aim to fully interconnect by 2045.

Eight out of the 18 grid-to-grid interconnection projects under the APG have been constructed and commercially operated.



The ASEAN Power Grid: From National Security to Regional Resilience



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Diversification	Resilience	Affordability	Energy Transition
Access to a wider mix of energy sources across ASEAN.	Alternative supply during outages, fuel disruptions, and extreme weather events.	Reduced need for costly reserve capacity and access to least-cost power.	Greater integration of solar, wind, and hydropower while maintaining reliability.

Electricity demand in Southeast Asia is expected to grow by approximately 60% by 2050, making regional cooperation increasingly important to ensure reliable, affordable, and sustainable power supplies.



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The ASEAN Power Grid Advancement Programme (APG-AP)

ASEAN Power Grid Advancement Programme (APG-AP)



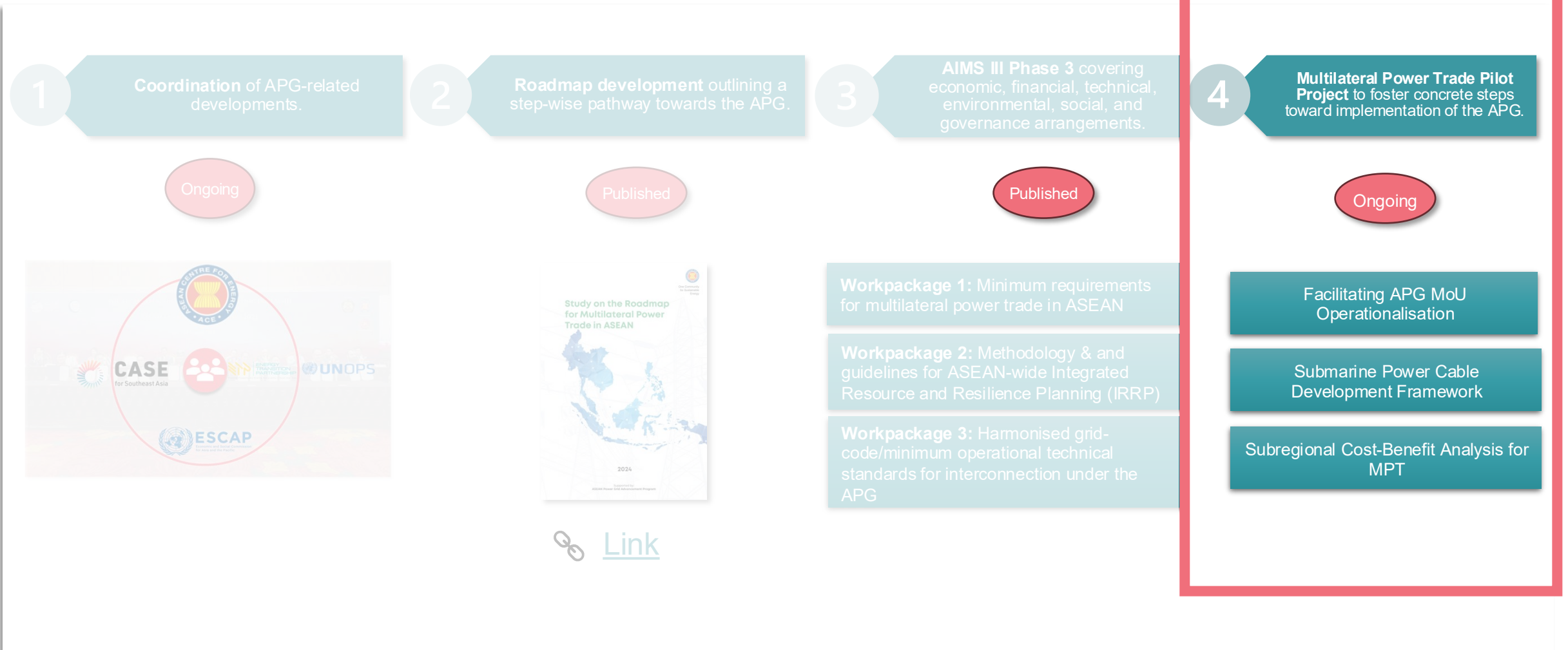
During:

- 08/23 – 12/26

Implemented by:

- ASEAN Centre for Energy (**ACE**);
- Southeast Asia Energy Transition Partnership (**ETP – UNOPS**);
- UN Economic and Social Commission for Asia and the Pacific (**UN ESCAP**).

Advancing the APG from planning stage to implementation:



Roadmap for Multilateral Power Trade in ASEAN



Background & Current Status

Overview of MPT progress in ASEAN and existing transmission infrastructure



Strategic Path Forward

Stepwise approach for MPT implementation, Subregion-led market development (West & East)



Key Issues

Clarifying minimum requirements, institutional development, financing challenges, grid topology, and renewable energy certificates



Roadmap & Financing

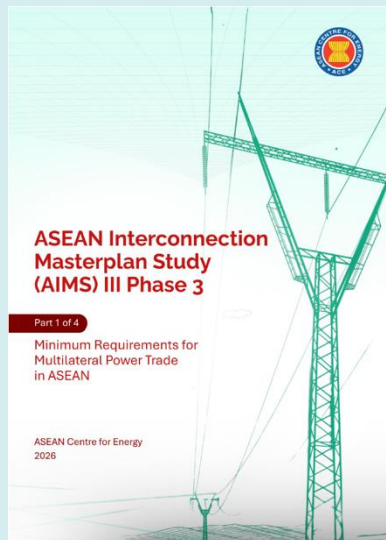
Long-term regional actions with tailored subregional strategies, Diverse financing options, including green taxonomy and private sector involvement

The ASEAN Interconnection Masterplan Studies (AIMS) III Phase 3



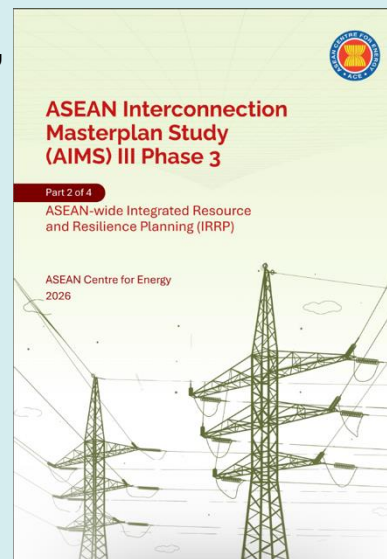
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Trade Efficiently



Defines the **market, regulatory, technical, and institutional requirements** needed to scale from bilateral trade towards multilateral regional power trading.

Plan Together



Establish a **regional planning framework** that aligns national power development plans, identifies Projects of Common Interest, and incorporates resilience and climate risks into long-term planning.

Connect Securely



Develop **common technical standards, grid codes, operational procedures, and interoperability requirements** to ensure reliable and secure cross-border electricity exchanges.



Implemented by





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On behalf of:



Federal Ministry
for the Environment, Climate Action,
Nature Conservation and Nuclear Safety

of the Federal Republic of Germany



Contact Us

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